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APPLICATION NO.	F	ILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/658,498	0/658,498 09/09/2003		J. David Campbell	J-2583C	1796
25884	7590	01/10/2005		EXAM	INER
JOHNSON		•	RABAGO, ROBERTO		
8310 16TH : P.O. BOX 9		MI/S 510		ART UNIT	PAPER NUMBER
STURTEVANT, WI 53177-0902				1713	

DATE MAILED: 01/10/2005

Please find below and/or attached an Office communication concerning this application or proceeding.

	Application No.	Applicant(s)					
	10/658,498	CAMPBELL ET AL.					
Office Action Summary	Examiner	Art Unit					
	Roberto Rábago	1713					
The MAILING DATE of this communication app Period for Reply	pears on the cover she t with the c	orrespond nce address					
A SHORTENED STATUTORY PERIOD FOR REPL' THE MAILING DATE OF THIS COMMUNICATION. - Extensions of time may be available under the provisions of 37 CFR 1.1 after SIX (6) MONTHS from the mailing date of this communication. - If the period for reply specified above is less than thirty (30) days, a reply If NO period for reply is specified above, the maximum statutory period of Failure to reply within the set or extended period for reply will, by statute Any reply received by the Office later than three months after the mailing earned patent term adjustment. See 37 CFR 1.704(b).	36(a). In no event, however, may a reply be time within the statutory minimum of thirty (30) days will apply and will expire SIX (6) MONTHS from a cause the application to become ABANDONEI	nely filed s will be considered timely. the mailing date of this communication. O (35 U.S.C. § 133).					
Status		•					
1) Responsive to communication(s) filed on	· _•						
2a) ☐ This action is FINAL. 2b) ☑ This	action is non-final.						
• • • • • • • • • • • • • • • • • • • •	Since this application is in condition for allowance except for formal matters, prosecution as to the ments is closed in accordance with the practice under <i>Ex parte Quayle</i> , 1935 C.D. 11, 453 O.G. 213.						
·	ix parte Quayle, 1955 C.D. 11, 45	33 O.G. 213.					
Disposition of Claims							
4) ⊠ Claim(s) 36-51 is/are pending in the application 4a) Of the above claim(s) is/are withdray 5) □ Claim(s) is/are allowed. 6) ⊠ Claim(s) 36-51 is/are rejected. 7) □ Claim(s) is/are objected to. 8) □ Claim(s) are subject to restriction and/o	wn from consideration.						
Application Papers							
9) The specification is objected to by the Examine	r.						
10) The drawing(s) filed on is/are: a) acc	☐ The drawing(s) filed on is/are: a)☐ accepted or b)☐ objected to by the Examiner.						
Applicant may not request that any objection to the	drawing(s) be held in abeyance. See	37 CFR 1.85(a).					
Replacement drawing sheet(s) including the correct 11) The oath or declaration is objected to by the Ex		, ,					
Priority under 35 U.S.C. § 119							
12) Acknowledgment is made of a claim for foreign a) All b) Some * c) None of: 1. Certified copies of the priority documents 2. Certified copies of the priority documents 3. Copies of the certified copies of the priori	s have been received. s have been received in Applicationity documents have been received (PCT Rule 17.2(a)).	on No d in this National Stage					
Attachment(s)							
1) Notice of References Cited (PTO-892) 2) Notice of Draftsperson's Patent Drawing Review (PTO-948) 3) Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08) Paper No(s)/Mail Date 12/1/2003.	4) Interview Summary (Paper No(s)/Mail Da 5) Notice of Informal Pa 6) Other:						

DETAILED ACTION

Specification

1. The lengthy specification has not been checked to the extent necessary to determine the presence of all possible minor errors. Applicant's cooperation is requested in correcting any errors of which applicant may become aware in the specification.

Claim Rejections - 35 USC § 102

2. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless -

- (b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.
- 3. Claims 36 and 42 are rejected under 35 U.S.C. 102(b) as being anticipated by DE 3026831.

The reference shows in Examples 1 and 8 the continuous production of polymer comprising styrene and divinyldioxane at 280°C in a stirred reactor, wherein the polymer is stated to be practically free of gel (page 2, line 16). Although the reference does not disclose the degree to which the reactor is "substantially filled", this limitation would be inherent because the skilled chemist would immediately envisage that the reactor would

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be efficiently operated in a substantially filled state. Accordingly, the reference contains all claimed limitations.

4. Claims 36, 42-44 and 47-49 are rejected under 35 U.S.C. 102(b) as being anticipated by Gustafson et al. (US 5,539,075).

The reference shows in Example 10 the radical polymerization of ethylene and 1,9-decadiene in a continuous agitated reactor at 270°C in the presence of propylene acting as a chain transfer agent. The reference does not disclose the degree to which the reactor is "substantially filled"; however, this limitation would be inherent because the skilled chemist would immediately envisage that the reactor would be efficiently operated in a substantially filled state. The reference does not disclose the residence time; however, the ordinary skilled chemist would immediately envisage the claimed range because applicants have claimed virtually the entire range of conventional values. The reference further makes no mention of the substantial presence of gels, and therefore it can be reasonably concluded that gels are absent or substantially absent in the reference method. The burden of proof is shifted to applicants to show that the polymer of the reference method is not substantially free of gel.

Claim Rejections - 35 USC § 103

5. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the

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invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

6. Claims 37, 38, 41, 45 and 46 are rejected under 35 U.S.C. 103(a) as being unpatentable over DE 3026831.

The parent claim is discussed with respect to this reference above. The limitations missing from the cited working examples are disclosed as follows: monomer percentage (pg. 2, lines 27-29), divinylbenzene (pg. 4, line13) and solvent (pg. 5, lines 14-19). One of ordinary skill in the art would be motivated to use these components in the disclosed method because they have been suggested as useful embodiments.

7. Claims 37 is rejected under 35 U.S.C. 103(a) as being unpatentable over Gustafson et al. (US 5,539,075).

The parent claim is discussed with respect to this reference above. The claimed range of divinyl monomer is suggested at col. 4, lines 52-56, providing motivation for the those of ordinary skill in the art to use such values.

Double Patenting

8. Claims 36-44 and 48-51 are rejected under the judicially created doctrine of obviousness-type double patenting as being unpatentable over claims 1-10 of U.S. Patent No. 5,986,020. Although the conflicting claims are not identical, they are not patentably distinct from each other because essentially the same method is being claimed. The additional limitation in the instant regarding the resultant polymer being

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"substantially free of gel" would be inherent in the claimed method because essentially the same method is being claimed.

9. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Roberto Rábago whose telephone number is (571) 272-1109. The examiner can normally be reached on Monday - Friday from 8:30 am - 4:00 pm.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, David Wu can be reached on (571) 272-1114. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

Roberto Rábago Primary Examiner

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RR January 7, 2005